ABSTRACT:

The invention relates to a method of analyzing an object data set which comprises points in a multi-dimensional space and in which a tubular structure occurs, said method comprising the following steps:

a) choosing a starting position in or near the tubular structure;

b) deriving a cutting plane through the tubular structure at the starting position,

c) determining a number of points forming part of the surface of the tubular structure in the vicinity of the starting position, and

d) calculating a gradient to the surface for each of said points.

The method also comprises the characterizing steps of:

e) determining for each point a vector from the center of the tubular structure to said point;

f) determining the angle between said vector and the gradient at said point;

g) adding said point to a selection of points if said angle is equal to or smaller than a predetermined ceiling value;

h) ussing said selection of points to calculate an orientation for the cutting plane such that the direction thereof is as parallel as possible to the longitudinal axis of the tubular structure at the starting position, and

i) repeating the steps a) through h) for a new starting position along the tubular structure if necessary.

The invention also relates to a computer program for carrying out the method according to the invention.

Fig. 1